Arc Length

Video 58 on www.corbettmaths.com

Examples

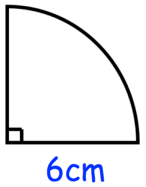
Workout

Click here

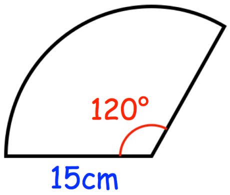
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Question 1: For each sector below, calculate the length of the arc.
Give your answers to one decimal place and include suitable units.

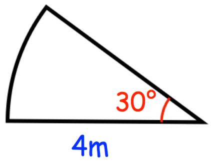
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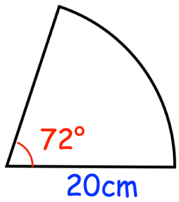
(b)



(c)

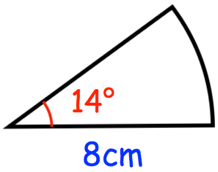


(d)

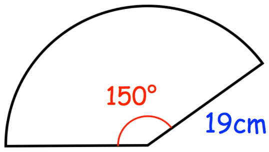


Question 2: For each sector below, calculate the length of the arc.
Give your answers to one decimal place and include suitable units.

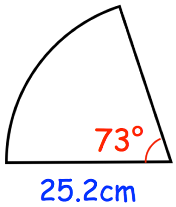
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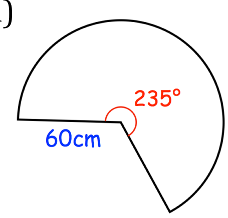
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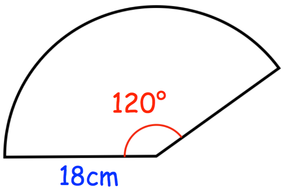


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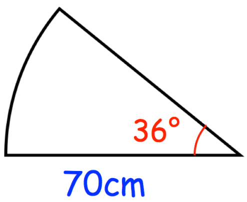


Question 3: For each sector below, calculate the length of the arc.
Leave your answer in terms of **π**

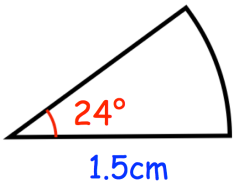
(a)



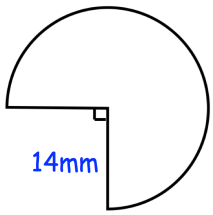
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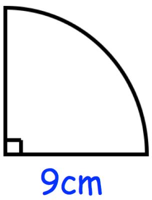


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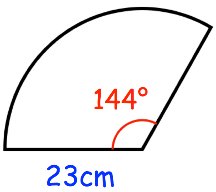


Question 4: Calculate the perimeter of each sector below
Give your answers to one decimal place and include suitable units.

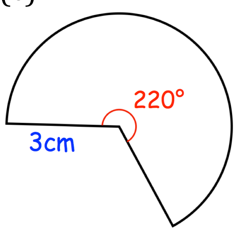
(a)



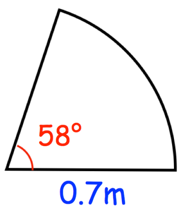
(b)



(c)



(d)

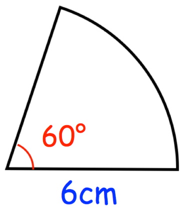


Arc Length

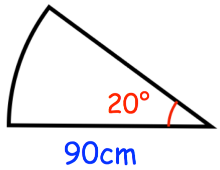
Video 58 on www.corbettmaths.com

Question 5: Calculate the perimeter of each sector below
Leave your answer in terms of π

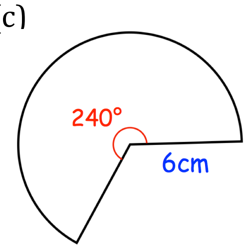
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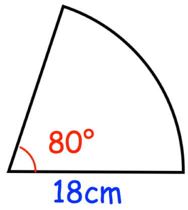
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(c)

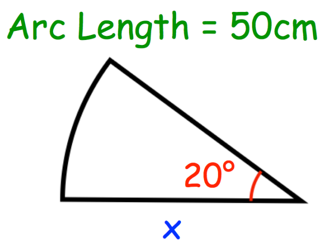


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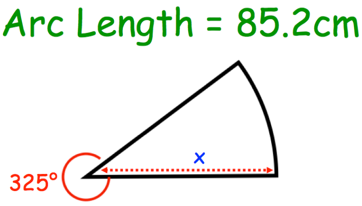


Question 6: The arc length of each sector has been given.
Calculate x
Give your answers to one decimal place and include suitable units.

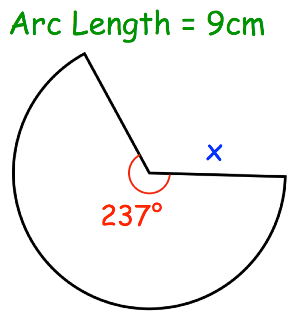
(a)



(b)

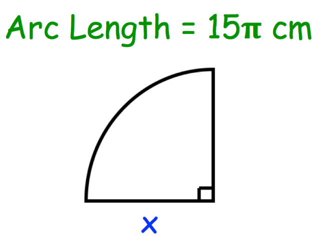


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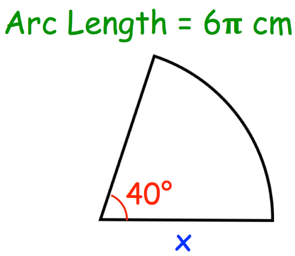


Question 7: The arc length of each sector has been given.
Calculate x

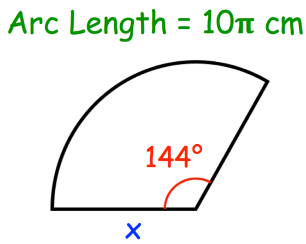
(a)



(b)

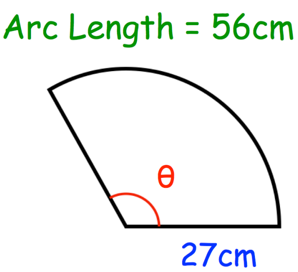


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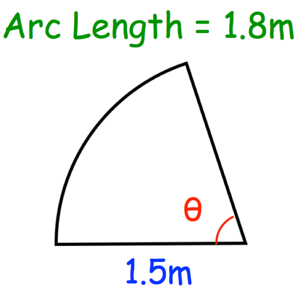


Question 8: The arc length of each sector has been given.
Calculate the size of the angle
Give your answers to one decimal place.

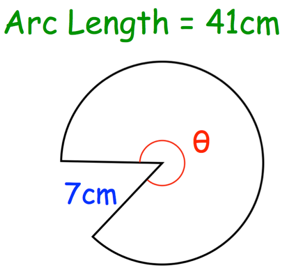
(a)



(b)



(c)

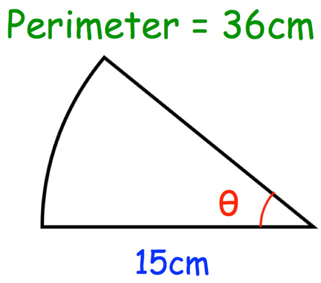


Arc Length

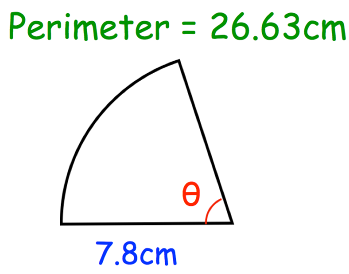
Video 58 on www.corbettmaths.com

Question 9: The perimeter of each sector has been given.
Calculate the size of the angle
Give your answers to one decimal place.

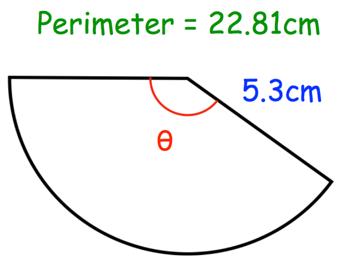
(a)



(b)

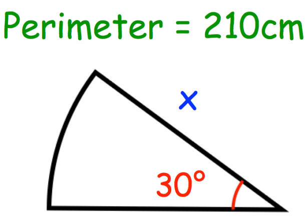


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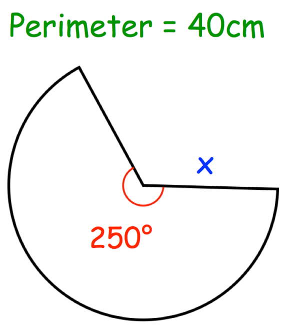


Question 10: The perimeter of each sector has been given.
Calculate x
Give your answers to one decimal place.

(a)

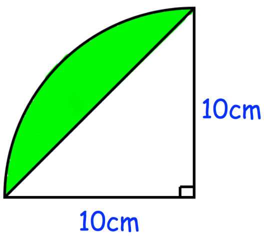


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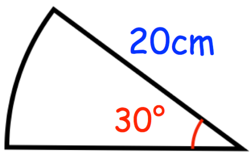


Apply

Question 1: Calculate the perimeter of the segment.



Question 2: James is calculating the perimeter of the sector.
Can you spot any mistakes?



Perimeter

$$= \frac{30}{360} \times \pi \times 20$$

$$= 5.236cm$$

Answers

Click here

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